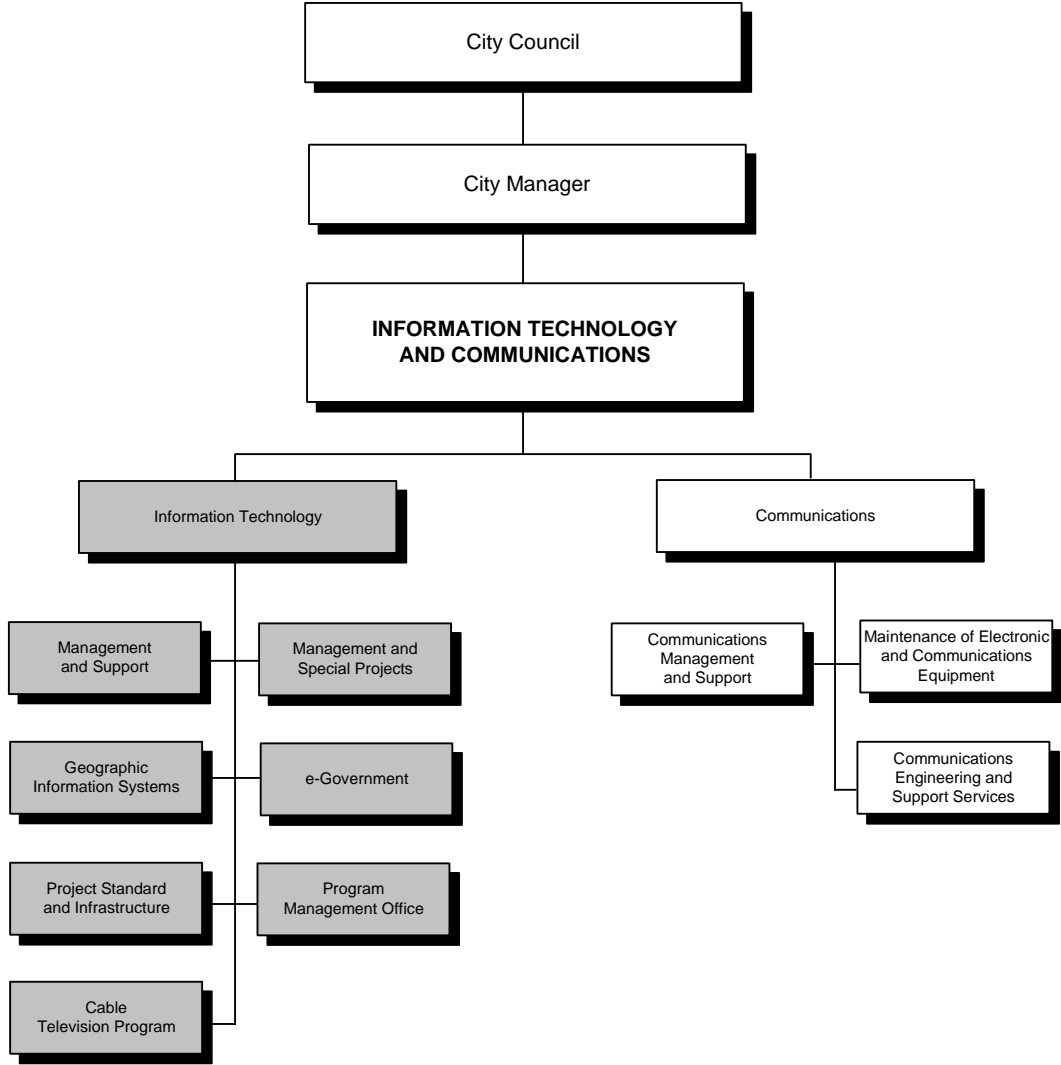# Information Technology & Communications

To establish strategies, policies and procedures for effective implementation of Citywide information and communication technologies; provide information to the citizens of the region through the City Government Cable Channel; provide electronic information and interactive services via the Internet; and provide effective wireless communications to the City and other governmental agencies through high quality systems and services, insuring the highest level of service to the public.

Information Technology and Communications

```
                    ┌─────────────────────────┐
                    │      City Council        │
                    └─────────────────────────┘
                                 │
                    ┌─────────────────────────┐
                    │      City Manager        │
                    └─────────────────────────┘
                                 │
                    ┌─────────────────────────┐
                    │  INFORMATION TECHNOLOGY  │
                    │   AND COMMUNICATIONS     │
                    └─────────────────────────┘
```

Information Technology

- Management and Support
- Management and Special Projects
- Geographic Information Systems
- e-Government
- Project Standard and Infrastructure
- Program Management Office
- Cable Television Program

Communications

- Communications Management and Support
- Maintenance of Electronic and Communications Equipment
- Communications Engineering and Support Services

Information Technology and Communications

Department Description

The Information Technology and Communications Department (IT&C) is comprised of two divisions: Communications and Information Technology. The Communications Division provides all wireless technologies; engineers, installs, maintains and repairs wireless voice and data communications systems and equipment; and contracts for commercially provided Citywide cellular voice and Cellular Digital Packet Data wireless data services. The Information Technology (IT) Division is responsible for strategic direction and IT operational policies and standards; coordinates major Citywide initiatives including Geographic Information Systems, the City's website, e-Government and IT training; and operates the City's cable TV program.

Milestones Met/Services Provided

During Fiscal Year 2002, IT&C obtained formal adoption by the City Council of the City's first ever IT Strategic Plan (ITSP). The ITSP provides for an IT governance process and defines the IT service delivery organization as well as technical strategies. In accordance with the ITSP, the Information Technology Division has instituted a new Program Management Office to improve accountability on IT projects, reduce project cost and schedule overruns, and establish a structured IT project management framework. Also, in accordance with the ITSP, the Communications Division has embarked on a wireless long range plan.

Analysis and planning is being completed by the Communications Division in conjunction with a consultant, and the process has begun to identify and recruit the internal staffing necessary to implement the public safety radio and data networks that will result from this plan.

IT&C boasts two award-winning programs – Cable Television and e-Government. City Access 24, the City's cable television channel that can be seen on both Cox Communications and Time Warner Cable Channel 24, received first place for Excellence in Government Programming at the National Association of Telecommunications Officers and Advisors government programming awards. City Access 24 strives to create greater awareness of local government, which facilitates the community's participation in local decision-making. The e-Government program is responsible for design and maintenance of the City's website www.sandiego.gov, and in 2001 was ranked America's Top City Website by Brown University's Taubman Center for Public Policy. The web development group oversees development and implementation of approximately 68 individual department websites, and recently implemented a content management system, which will allow departments more hands-on access to monitor and maintain the data and information provided on their sites.

The Communications Division continues implementing commercially provided wireless data services – Cellular Digital Packet Data (CDPD) – for both Public Safety and Public Service departments. An example of implementation is the Police Department, which uses this technology to send real-time reports from field officers to supervisors and department management for more efficient neighborhood policing. Another example is the Environmental Services Department, which has maximized cost effective routing and collection of refuse by using live CDPD location data from approximately 250 refuse collection vehicles outfitted by the Communications Division with automatic vehicle location devices.

Future Outlook

With the City Council's adoption of the IT Strategic Plan, the Information Technology and Communications Department will be moving forward with identified initiatives and high priority projects. The governance framework called for in the IT Strategic Plan has been implemented and work has begun on several of the major initiatives called for in the plan. The future of the Information Technology and Communications Department promises to be challenging and exciting as the City's IT evolution progresses.

Within the IT Division, the Program Management Office is currently working with consultants to assess the City's IT Program Management maturity. A plan will be designed for implementing the best practices for the office. Plans include a mentoring and training program for City IT project managers.

Another major initiative called for in the Strategic Plan is assessing the City's IT organization. This project is managed by the Project Standards and Infrastructure (PS&I) Program within the IT Division. The PS&I group is currently conducting an IT staffing study and will reassess the use of IT resources and implement a plan that best meets the City's IT needs.

The Communications Division is currently in the process of conducting a wireless communications study, which is the introductory stage of the City's wireless long range plan. Consultants are assisting the Communications Division to assess the City's current wireless infra-structure and will work with City staff to determine the direction the City will take in the area of wireless technology.

Information Technology and Communications

Significant Budget Adjustments

IT&C - Information Technology	Positions		Cost
Personnel Expense Adjustments	0.00	$	103,636
Adjustments to reflect the annualization of the Fiscal Year 2002 negotiated salary compensation schedule, average salaries, fringe benefits and other personnel expense adjustments.			
Non-Discretionary	0.00	$	217,566
Adjustments to reflect expenses that are determined outside of the department's direct control. Examples of these adjustments include utilities, insurance, and rent.			
Staffing for Program Management Office (PMO)	1.00	$	140,388
Addition of 1.00 Program Manager. This position will support the PMO in providing on-going program management training, mentoring, and "loaned" project management support to departments that do not have trained IT program managers.			
Staffing for Multimedia Production	1.00	$	55,059
Addition of 1.00 Multimedia Production Specialist. The video production producer/director position is primarily responsible for the creation of video productions for, and pertaining to, participating enterprise fund deptartments. This position will also produce video productions for Internet video streaming on the City's website.			
Support for Video Production	0.00	$	10,040
Due to expanding services provided by the Cable Program to City Council as well as numerous other City departments, additional equipment is needed to keep pace with video technology and to enable staff to work on multiple projects simultaneously.			
Budgetary Savings Plan	0.00	$	(44,638)
Reduction of temporary help to achieve budgetary savings.			

Significant Budget Adjustments (continued)

IT&C - Communications	Positions	Cost
Personnel Expense Adjustments	0.00	$ 152,556
Adjustments to reflect the annualization of the Fiscal Year 2002 negotiated salary compensation schedule, average salaries, fringe benefits and other personnel expense adjustments.		
Staffing and Support for SCADA (Reimbursable)	2.25	$ 166,693
Addition of 1.00 Communications Technician, 1.00 Electronics Technician, 0.25 Associate Communications Engineer, and support for the design, installation and maintenance of a Supervisory Control and Data Acquisition system for MWWD. These positions are funded by MWWD.		
Staffing and Support for SCADA (Reimbursable)	2.25	$ 166,693
Addition of 1.00 Communications Technician, 1.00 Electronics Technician, 0.25 Associate Communications Engineer, and support for the design, installation and maintenance of a Supervisory Control and Data Acquisition system for the Water Department. These positions are funded by the Water Department.		
Support for FCC Licensing	0.00	$ 18,000
Effective December 3, 2001, the Federal Communications Commission (FCC) requires that all licenses have a mandatory registration number. The FCC requires new and renewal license applications electronically; as a result, license costs have increased by 50 percent+B21.		
Support for Communications Tower Registration	0.00	$ 10,000
Effective December 3, 2001, the Federal Communications Commission adopted a rule requiring mandatory registration for all antenna towers. Funding is needed to perform required work to comply with applicable lighting requirements for aircraft safety, and to register and retain the tower at the City Operations Building, per new FCC requirements.		

Information Technology and Communications

Significant Budget Adjustments (continued)

| IT&C - Communications (continued)	Positions		Cost
Staffing for Police Department	0.09	$	6,730
Addition of 0.09 Communications Technician to support the addition of 10.00 Police Officers in the Neighborhood Policing Program. This program addresses public safety issues and problems contributing to crime in the City's neighborhoods.			
Non-Discretionary	0.00	$	(14,091)
Adjustments to reflect expenses that are determined outside of the department's direct control. Examples of these adjustments include utilities, insurance, and rent.			
Budgetary Savings Plan	(1.30)	$	(97,204)
Reduction of 1.30 Communications Technician providing maintenance for electric communications equipment.			

Information Technology and Communications

Information Technology and Communications			
	FY 2001 ACTUAL	FY 2002 BUDGET	**FY 2003 PROPOSED**
Positions	66.54	70.38	**75.67**
Personnel Expense	$ 5,433,806	$ 5,552,562	**$ 6,183,692**
Non-Personnel Expense	1,485,784	1,391,100	**1,651,398**
TOTAL	$ 6,919,590	$ 6,943,662	**$ 7,835,090**

Department Staffing	FY 2001 ACTUAL	FY 2002 BUDGET	**FY 2003 PROPOSED**
GENERAL FUND			
IT&C - Communications	49.54	50.36	**53.65**
Total	**49.54**	**50.36**	**53.65**
INFORMATION TECHNOLOGY FUND			
IT&C - Information Technology	17.00	20.02	**22.02**
Total	**17.00**	**20.02**	**22.02**

Department Expenditures	FY 2001 ACTUAL	FY 2002 BUDGET	**FY 2003 PROPOSED**
GENERAL FUND			
IT&C - Communications	$ 4,407,305	$ 4,719,146	**$ 5,128,523**
Total	**$ 4,407,305**	**$ 4,719,146**	**$ 5,128,523**
INFORMATION TECHNOLOGY FUND			
IT&C - Information Technology	$ 2,512,285	$ 2,224,516	**$ 2,706,567**
Total	**$ 2,512,285**	**$ 2,224,516**	**$ 2,706,567**

Information Technology and Communications

Source of Funding

Information Technology Fund $2,706,567

General Fund $5,128,523
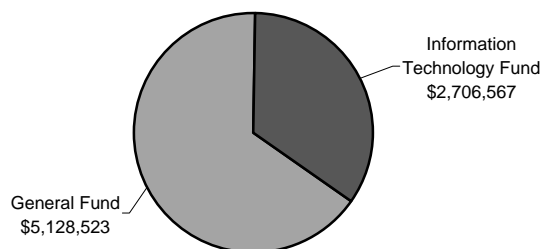
Allocation of Funding

Information Technology $2,706,567

Communications $5,128,523
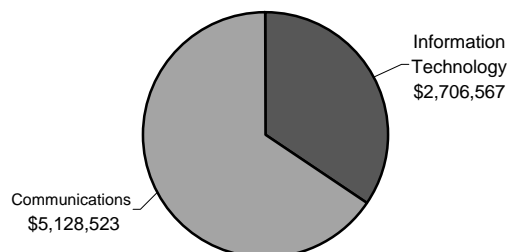
Budget Dollars at Work

$7,464,587 In City projects involving Geographic Information System integration
142 Data processing agreements completed
150 Public meetings covered by cable program
25 Million City website hits
32,385 Communications equipment units maintained
21 Fixed communication sites registered and maintained

Key Performance Measures

	FY 2001 Actual	FY 2002 Budget	**FY 2003 Proposed**
Average cost per training class to administer and manage Citywide software training program.[1]	N/A	$24	**$42**
Average cost per Geographic Information Systems (GIS) department, division, or program to implement enterprise GIS Citywide.	$4,666	$4,067	**$3,592**
Average cost per web page to implement electronic public access to City information and services.	$12	$25	**$25**
Average cost/project to provide enterprise level program management services.	N/A	N/A	**$9,975**
Average cost per public service announcement and feature edited production.[1]	N/A	$3,179	**$4,287**
Average cost per piece of equipment used to operationally maintain the City's inventory of radio communications and electronic equipment, including all wireless backbone systems.	$113	$115	**$121**
Average cost per license to manage all City communications projects, provide techical assistance, visit and evaluate all communications sites, and apply and renew all FCC radio licenses. [2]	$3,096	$11,466	**$14,100**

[1]New measure in FY02. Experience has provided the ability to better project costs.

[2] Average cost excludes $105,552 for leased sites in FY 1998 - 2001, and $109,052 for leased sites in FY 2002, and $43,065 in onetime funding for the Radiation Frequency Radiation Safety Program.

Information Technology and Communications

Division/Major Program Descriptions

Communications	The Communications Division's roles and responsibilities include providing effective wireless communications to the City and other governmental agencies through high quality systems and services insuring the highest level of service to the public. The Communications Division plans, engineers, and coordinates wireless communications projects and systems, such as writing and evaluating specifications for the City's communications equipment; provides technical advice to customers; procures, develops and manages the City's radio communications sites and FCC licenses; installs, maintains and repairs all City radio communications equipment, most electronic equipment and major electronic components; and provides wireless voice, data and paging services and special electronic alarm and other systems.

Information Technology	The Information Technology Division strives to identify and implement more effective and less costly IT investments, to leverage economies of scale and to take advantage of the "big picture" perspective in balancing department interests versus Citywide direction. IT&C helps ensure standards, avoid redundancy and duplicative systems, and identifies inadvertent impacts of each project on others. The Information Technology Division's roles and responsibilities include managing the operating agreement with San Diego Data Processing Corporation (SDDPC), including negotiating user rates and the Service Level Agreement (SLA) between SDDPC and the City. The Information Technology Division also provides leadership for and support of Citywide IT systems, computer training and contracts for standard and non-standard software and hardware procurement. Information Technology also manages implementation of the IT Strategic Plan, the Program Management Office, Geographic Information Systems, e-Government, the Telecommuting Program and Project Standards and Infrastructure. The Cable Television Program, also within Information Technology, provides administration and enforcement of existing cable television and service provider franchises, addresses policy on the use of City rights-of-way, and provides video production services and City Access 24, the City of San Diego's government cable television channel.

Information Technology and Communications

Salary Schedule

GENERAL FUND

IT&C - Communications

Class	Position Title	FY 2002 Positions	FY 2003 Positions	Salary and Fringe	Total
1104	Account Clerk	1.00	1.00	44,540	44,540
1106	Senior Management Analyst	1.00	1.00	82,619	82,619
1219	Assoc Communications Engineer	2.00	2.50	91,006	227,514
1346	Senior Communications Engineer	1.00	1.00	101,243	101,243
1425	Sr Communications Tech Supv	1.00	1.00	99,642	99,642
1426	Communications Technician	24.30	25.09	74,770	1,875,980
1427	Communications Technician Supv	4.00	4.00	85,988	343,952
1436	Equipment Technician I	4.54	4.54	50,678	230,076
1438	Equipment Technician II	1.00	1.00	56,300	56,300
1443	Electronics Technician	0.00	2.00	64,436	128,872
1648	Payroll Specialist II	1.00	1.00	49,106	49,106
1859	Senior Communications Tech	7.00	7.00	79,854	558,978
1876	Executive Secretary	0.01	0.01	60,400	604
1879	Senior Clerk/Typist	1.00	1.00	50,725	50,725
2132	Department Director	0.50	0.50	152,608	76,304
2153	Deputy City Manager	0.01	0.01	208,800	2,088
2214	Deputy Director	1.00	1.00	124,263	124,263
	Overtime Budgeted	0.00	0.00		22,818
	Total	**50.36**	**53.65**		**$ 4,075,624**

Information Technology and Communications

Salary Schedule (continued)

INFORMATION TECHNOLOGY FUND

IT&C - Info Technology

Class	Position Title	FY 2002 Positions	FY 2003 Positions	Salary and Fringe	Total
1106	Senior Management Analyst	2.00	2.00	82,628	165,255
1218	Associate Management Analyst	0.50	0.50	73,980	36,990
1230	Multimedia Production Specialist	0.00	1.00	55,059	55,059
1349	Info Systems Analyst III	6.00	6.00	81,143	486,855
1489	Graphic Design Supervisor	1.00	1.00	67,783	67,783
1490	Graphic Designer	1.00	1.00	57,870	57,870
1535	Clerical Assistant II	1.00	1.00	41,622	41,622
1876	Executive Secretary	1.01	1.01	60,381	60,985
1917	Supervising Management Analyst	1.00	1.00	90,603	90,603
2111	Assistant City Manager	0.01	0.01	210,100	2,101
2132	Department Director	0.50	0.50	152,608	76,304
2153	Deputy City Manager	1.00	1.00	182,452	182,452
2233	Program Manager	1.00	1.00	104,181	104,181
2270	Program Manager	4.00	5.00	125,985	629,924
	Temporary Help	0.00	0.00		50,084
	Total	**20.02**	**22.02**		**$ 2,108,068**
	INFORMATION TECHNOLOGY AND COMMUNICATION TOTAL	**70.38**	**75.67**		**$ 6,183,692**

Five-Year Expenditure Forecast

	FY 2003 PROPOSED		FY 2004 FORECAST		FY 2005 FORECAST		FY 2006 FORECAST		FY 2007 FORECAST
Positions	75.67		86.67		95.67		101.67		103.67
Personnel Expense	$	6,183,692	$	7,305,337	$	8,145,945	$	8,797,313	$ 9,223,515
Non-Personnel Expense		1,651,398		1,961,962		2,894,421		3,059,791	3,170,515
TOTAL EXPENDITURES	$	7,835,090	$	9,267,299	$	11,040,366	$	11,857,104	$ 12,394,030

Fiscal Year 2004

Addition of staffing and support, including two vehicles, for 1.00 Associate Communications Engineer, 1.00 Information Systems Analyst III, 1.00 Senior Communications Engineer, 1.00 Senior Communications Technician, and 1.00 Communications Technician Supervisor to implement the City's Public Safety Communication Project Plan II (PSCPII).

Additional support for parts to replace aging City public safety communications equipment.

Addition of 1.00 Program Manager to continue to implement and monitor the IT Strategic Plan (ITSP), and to provide project management for key ITSP initiatives not covered under any other project management area.

Addition of staffing and support for 1.00 Senior Management Analyst to track performance metrics, and maintain project dashboard, and 1.00 Information Systems Analyst III to provide program management training and mentoring and perform project health checks, and support project management tools/processes.

Addition of 1.00 Multimedia Production Specialist and support to keep pace with increased demand for Cable TV Program services.

Addition of 1.00 Information Systems Analyst III and support for application marketing and customer service for e-Government services.

Addition of 1.00 Senior Management Analyst and support to oversee San Diego Data Processing (SDDPC) rates analysis, review and negotiations, SDDPC Service Level Agreement performance metrics tracking and A-List tracking and administration.

Fiscal Year 2005

Addition of staffing and support, including two vehicles, for 4.00 Communications Technicians and 2.00 Equipment Technicians I to implement the PSCPII.

Additional support for parts and communications equipment to implement the PSCPII.

Addition of 1.00 Information Systems Analyst III and support to provide ongoing program management training, mentoring, lead efforts to review and approve new IT project initiatives, perform project health checks and support project management tools/processes.

Addition of 1.00 Information Systems Analyst III and support for project management specializing in application development for City departments.

Addition of 1.00 Multimedia Production Specialist and support to keep up with increased demand for Cable TV Program services.

Fiscal Year 2006

Addition of staffing and support, including two vehicles, for 2.00 Communications Technicians and 2.00 Equipment Technicians I to implement the PSCPII.

Addition of 1.00 Information Systems Analyst III and support to provide ongoing program management training, mentoring, lead efforts to review and approve new IT project initiatives, perform project health checks and support project management tools/processes.

Information Technology and Communications

Five-Year Expenditure Forecast (continued)

Fiscal Year 2006 (continued)

Addition of 1.00 Information Systems Analyst III and support to serve as e-Commerce analyst/architect working with the Treasurer's office and departmental clients to facilitate revenue generating transaction processing associated with new application development projects.

Fiscal Year 2007

Addition of 1.00 Information Systems Analyst III and support to provide ongoing program management training, mentoring, lead efforts to review and approve new IT project initiatives, perform project health checks and support project management tools/processes.

Addition of 1.00 Information Systems Analyst III and support for application marketing and customer services for e-Government services.

Revenue and Expense Statement

INFORMATION TECHNOLOGY FUND 50064	FY 2001 ACTUAL		FY 2002 ESTIMATED		**FY 2003 PROPOSED**
BEGINNING BALANCE AND RESERVE					
Balance from Prior Year	$	93,479	$	(104,108)	**$ 117,258**
TOTAL BALANCES	$	93,479	$	(104,108)	**$ 117,258**
REVENUE					
Community & Economic Development Ent. Funds	$	-	$	3,638	**$ 5,294**
Convention Center Expansion Project		1,244		1,380	**-**
Development Services		122,388		119,335	**143,456**
Emergency Medical Services		-		-	**2,462**
Engineering & Capital Projects		64,183		109,890	**173,926**
Environmental Growth		-		-	**404**
Environmental Services Enterprise Funds		22,707		32,505	**56,349**
Facilities Financing		2,705		2,637	**3,838**
General Services Enterprise Funds		4,964		8,220	**75,329**
General Services - Equipment Division		11,056		10,780	**16,171**
General Fund		1,077,626		1,087,825	**920,118**
Maintenance Assessment Districts		2,567		-	**-**
Metropolitan Wastewater		360,137		486,321	**752,871**
Other (TOT, Arts & Culture, Etc.)		7,650		143,323	**-**
Optimization		910		-	**-**
Park & Recreation Enterprise Funds		1,214		3,130	**4,154**
Qualcomm Stadium		1,438		1,402	**2,040**
Real Estate Assets Enterprise Funds		2,842		2,771	**4,033**
Retirement Program		11,685		16,203	**27,634**
Risk Management		19,920		17,037	**24,990**
San Diego Geographic Information Systems		271,082		-	**-**
Solid Waste Local Enforcement Agency		-		-	**569**
TransNet Funds		80,600		80,600	**80,600**
Transportation - Streets & Street Lights		14,738		15,331	**20,649**
Transportation - Traffic TCRS Grant		-		-	**-**
Water Department		233,042		303,554	**540,636**
TOTAL OPERATING REVENUE	$	2,314,698	$	2,445,882	**$ 2,855,521**
TOTAL BALANCE AND REVENUE	$	2,408,177	$	2,341,774	**$ 2,972,779**

Information Technology and Communications

Revenue and Expense Statement

EXPENSE						
Personnel Expense	$	2,110,643	$	1,862,940	$	**2,108,068**
Non-Personnel Expense		391,267		361,576		**598,498**
Prior Year expenditures		10,375		-		**-**
TOTAL OPERATING EXPENSE	$	2,512,285	$	2,224,516	$	**2,706,566**
RESERVE	$	-	$	-	$	**-**
BALANCE	$	(104,108)	$	117,258	$	**266,213**
TOTAL EXPENSE, RESERVE AND BALANCE	$	2,408,177	$	2,341,774	$	**2,972,779**